



**Government of
Saskatchewan**

Interim Annual Report 1999

Saskatchewan Health Vital Statistics

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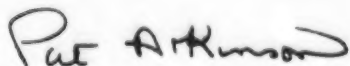
Letters of Transmittal

To the Honourable Jack Wiebe
Lieutenant-Governor of Saskatchewan

May It Please Your Honour:

We respectfully submit, for your consideration, the Interim Report on Saskatchewan Vital Statistics for the calendar year 1999.

Respectfully submitted,



The Honourable Pat Atkinson
Minister of Health



The Honourable Judy Junor
Associate Minister of Health

To the Honourable Pat Atkinson
Minister of Health
and The Honourable Judy Junor
Associate Minister of Health

Your Honours:

On behalf of department staff, I am pleased to present the Interim Report on Saskatchewan Vital Statistics for the calendar year 1999.

This interim report presents a concise record of those vital events that occurred in Saskatchewan during the calendar year 1999.

Respectfully submitted,



Glenda Yeates
Deputy Minister

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Terms and Definitions

A summary of symbols, definitions, and the method of computing rates used in this report are given below.

Definitions

Population	This report contains postcensal estimates for 1982 to 1985, 1987 to 1990, 1992 to 1995, 1997 to 1999 and final census figures for 1981, 1986, 1991, and 1996.
Live Births	Infants born alive, i.e., excluding stillbirths.
Stillbirths	January and February, 1994 - Foetal deaths of 20 or more weeks gestation. March to December 1994, 1995 to 1999 - The definition of Stillbirths under <i>The Vital Statistics Act</i> was changed on March 1, 1994 to mean foetal deaths of 500 grams or more.
Deaths	Excludes stillbirths.
Infant Deaths	Deaths under 1 year of age.
Neonatal Deaths	Deaths under 28 days (4 weeks) of age.
Perinatal Deaths	Foetal deaths of 20 or more weeks gestation (January and February 1994) or foetal deaths of 500 grams or more (March to December 1994, 1995 to 1999) plus infant deaths under 7 days (1 week) of age.
Natural Increase	Excess of births over deaths.

Rates (unless otherwise indicated, computed as follows)

Live Births	: per 1,000 population
Stillbirths	: per 1,000 live births
Marriages	: per 1,000 population
Divorces	: per 100,000 population
Natural Increase	: per 1,000 population

Causes of Death

All Causes	: per 100,000 population
Infant	: per 1,000 live births
Neonatal	: per 1,000 live births
Perinatal	: per 1,000 live births and stillbirths

Notes

1. Causes of death are classified according to the 9th (1975) Revision of the International Classification of Diseases, Injuries and Causes of Death, which was put into effect on January 1, 1979.

Introduction

The Vital Statistics Interim Report presents a concise record of those vital events, which occurred in Saskatchewan during the calendar year 1999. The Interim Report has been prepared in response to the requirements contained in The Tabling of Documents Act (1973).

The Vital Statistics Interim Report - 1999 records vital events by place of occurrence for 1999 (vital events which occurred in Saskatchewan in 1999). It includes for example, births to Saskatchewan residents who were in the province at the time of giving birth and residents of other provinces (or countries) who were in Saskatchewan at the time of giving birth. The data in this report are based on original registration forms and do not include amendments. The vital events recorded in this report for years previous to 1999 are by place of residence, unless otherwise indicated.

Table 1. Summary of Vital Statistics, Saskatchewan, 1994 - 1999

Item	1994	1995	1996	1997	1998*	1999*
Population	1,016	1,016	1,023	1,024	1,024	1,028
Live Births	14,038	13,499	13,300	12,860	12,710	12,481
Rate++	13.8	13.2	13.0	12.6	12.4	12.1
Deaths	8,308	8,495	8,765	8,637	8,838	8,947
Rate++	8.2	8.4	8.6	8.4	8.6	8.7
Natural Increase	5,724	5,004	4,535	4,223	3,872	3,534
Rate++	5.6	4.9	4.4	4.1	3.8	3.4
Infant Deaths	125	123	112	114	90	76
Rate**	8.9	9.1	8.4	8.9	7.1	6.1
Neonatal Deaths	76	74	76	77	83	66
Rate**	5.4	5.5	5.7	6.0	6.5	5.3
Perinatal Deaths@						
500 grams or more (20+ weeks gestation)	131(145) ⁰	142	119	127	121	115
Rate+++	9.3(10.3) ⁰	10.5	8.9	9.8	9.5	9.2
500 grams or more (28+ weeks gestation)	116(126) ⁰	117	96	112	107	91
Rate+++	8.3(8.9) ⁰	8.6	7.2	8.7	8.4	7.3
Stillbirths@						
500 grams or more (20+ weeks gestation)	73(82) ⁰	82	59	60	62	72
Rate**	5.2(5.8) ⁰	6.1	4.5	4.7	4.9	5.8
500 grams or more (28+ weeks gestation)	58(63) ⁰	57	36	45	48	48
Rate**	4.1(4.5) ⁰	4.2	2.7	3.5	3.8	3.8
Marriages	5,689	5,799	5,671	5,707	5,671	5,900
Rate++	5.6	5.7	5.5	5.6	5.5	5.7
Divorces and Annulments	2,319	2,328	2,211	2,195	2,223	2,230

* Preliminary figures - See Introduction, page 3

** Rate per 1,000 live births

++ Rate per 1,000 population

+++Rate per 1,000 total births (live births and stillbirths)

⁰ See Terms and Definitions, page 1

A. Population

1. The Historical Trend

The estimated population of 1,027,780 for 1999 is a very slight increase of 0.33 per cent over the 1998 estimated population of 1,024,387.

Table 2. The Historical Trend in
Saskatchewan Population

Year	Population (000's)
1931	922
1941	896
1951	832
1961	925
1971	926
1981	968
1991	997
1999	1,028*

* Statistics Canada Postcensal Estimate.
All other figures are final census.

2. The Percentage Distribution of the Total Population

During the past 30 years, the proportion of older people (65 years of age and over) has been increasing in Canada as a whole and in Saskatchewan. In Saskatchewan, however, the proportion of persons 65 years of age and over is greater than in Canada as a whole (14.5 percent and 12.4 percent respectively).

Table 3. Distribution of Total Population, Saskatchewan, 1999 (000's)

<u>Age Group</u>	<u>Canada</u>		<u>Saskatchewan</u>	
	<u>Number</u>	<u>Percent</u>	<u>Number</u>	<u>Percent</u>
Total	30,491.3	100.0	1,027.8	100.0
0-19	7,979.3	26.2	305.2	29.7
20-44	11,781.9	38.6	367.1	35.7
45-64	6,939.5	22.8	206.7	20.1
65+	3,790.6	12.4	148.7	14.5

Table 4. Percentage Distribution by Sex, Saskatchewan, for Selected Years

<u>Year</u>	<u>Male</u>	<u>Female</u>	<u>Males per 100 Females</u>
1921	54.6	45.4	120
1931	54.2	45.8	119
1941	53.3	46.7	114
1951	52.2	47.8	109
1961	51.8	48.2	108
1971	50.8	49.2	103
1981	50.2	49.8	101
1991	49.6	50.4	99
1999	49.7	50.3	99

B. Births

1. Live Births

During the year 1999 a total of 12,481 live births occurred in the Province of Saskatchewan. This total includes births to Saskatchewan mothers residing in the Province of Saskatchewan at the time of giving birth and those births occurring to mothers who normally reside outside the province but who were in Saskatchewan at the time of giving birth.

The total of 12,481 live births represents a birth rate of 12.1 live births per 1,000 population, the same as last year's birth rate.

The 1997 live birth rates for Saskatchewan, for Canada, and for the Provinces are shown below for comparison.

Table 5. Live Birth Rates per 1,000 Population, Canada and Provinces, 1997

Province	Rate
Canada	11.7
Newfoundland	9.8
Prince Edward Island	11.6
Nova Scotia	10.6
New Brunswick	10.5
Quebec	10.9
Ontario	11.8
Manitoba	12.9
Saskatchewan	12.6
Alberta	13.0
British Columbia	11.3
Yukon	14.7
North West Territories	21.7

2. Stillbirths

During the year 1999 a total of 72 stillbirths occurred in the province.

The definition of occurrence is given in the introduction. The 72 stillbirths occurred after 20 or more weeks gestation; 48 of the stillbirths occurred after 28 or more weeks gestation. These two totals represent rates of 5.8 and 3.8 stillbirths per 1,000 live births, respectively.

C. Deaths

During the year 1999 a total of 8,947 deaths occurred within the Province of Saskatchewan. This represents a crude death rate of 8.7 deaths per 1,000 population, which is slightly higher than the crude death rate experienced in 1998.

The 1997 crude death rates for Saskatchewan, for Canada, and for the provinces are shown in the table below for comparison.

Table 6. Crude Death Rates per 1,000 Population, Canada and Provinces, 1997

Province	Rate
Canada	7.2
Newfoundland	7.8
Prince Edward Island	7.5
Nova Scotia	8.6
New Brunswick	7.9
Quebec	7.4
Ontario	7.1
Manitoba	8.4
Saskatchewan	8.4
Alberta	5.8
British Columbia	6.9
Yukon	3.8
North West Territories	3.8

Table 7. Age Specific Death Rates per 1,000 Population, Saskatchewan, 1984 - 1999

Year	All Ages	Under 5	5-14	Age Group		45-64	65+
				15-24	25-44		
1984	7.7	2.4	0.2	0.9	1.3	6.8	45.0
1985	7.9	2.7	0.3	1.0	1.2	7.0	47.0
1986	8.0	2.3	0.3	1.2	1.2	7.2	46.5
1987	7.7	2.2	0.4	1.1	1.1	6.6	44.8
1988	8.0	2.1	0.3	1.0	1.3	6.7	46.3
1989	7.9	2.0	0.2	0.8	1.2	6.2	45.4
1990	8.0	2.0	0.2	0.9	1.1	6.3	46.0
1991	8.1	1.8	0.2	1.0	1.2	6.0	45.9
1992	7.8	1.7	0.2	0.9	1.1	5.5	44.0
1993	8.1	1.9	0.2	0.9	1.1	5.8	44.8
1994	8.2	2.0	0.3	0.8	1.1	5.9	44.9
1995	8.4	2.2	0.3	0.8	1.2	5.8	45.5
1996	8.6	1.9	0.2	0.7	1.2	5.5	47.4
1997	8.4	2.0	0.3	0.7	1.2	5.3	46.9
1998*	8.6	1.6	0.1	0.8	1.0	5.2	48.4
1999*	8.7	1.5	0.2	0.6	1.1	5.2	49.2

* Preliminary figures.

Table 8. Number of Deaths by Cause Occurring in Saskatchewan in 1999

	Deaths	Percent	Rate
All Causes of Death	8,947	100.0	870.3
01 Intestinal Infectious Diseases	3	0.0	0.3
02 Tuberculosis	3	0.0	0.3
03 Other Bacterial Diseases	48	0.5	4.7
04 Viral Diseases	18	0.2	1.8
07 Other Infectious, Parasitic Diseases	7	0.1	0.7
08 M N of Lip, Oral Cavity, Pharynx	24	0.3	2.3
09 M N of Digestive Organs, Peritoneum	570	6.4	55.4
08 M N of Respiratory & Related Organs	616	6.9	59.9
11 M N of Bone, Skin, Breast	195	2.2	19.0
12 M N of Genitourinary Organs	438	4.9	42.6
13 M N of Other & Unspecified Sites	187	2.1	18.2
14 M N of Lymph & Haemopoietic Tissue	194	2.2	18.9
15 Benign Neoplasm	12	0.1	1.2
17 Other & Unspecified Neoplasm	39	0.4	3.8
18 Endocrine & Metabolic Diseases	319	3.6	31.0
19 Nutritional Deficiencies	13	0.1	1.3
20 Diseases of Blood-Forming Organs	42	0.5	4.1
21 Mental Disorders	230	2.6	22.4
22 Diseases of the Nervous System	319	3.6	31.0
24 Diseases of Ear & Mastoid Process	2	0.0	0.2
25 Rheumatic Fever/Heart Disease	25	0.3	2.4
26 Hypertensive Disease	91	1.0	8.9
27 Ischaemic Heart Disease	1,563	17.5	152.0
28 Pulmonary & Other Heart Disease	830	9.3	80.7
29 Cerebrovascular Disease	722	8.1	70.2
30 Other Diseases of Circulatory System	212	2.4	20.6
31 Diseases of Upper Respiratory Tract	1	0.0	0.1
32 Other Diseases of Respiratory System	939	10.5	91.3
34 Other Parts of Digestive System	299	3.3	29.1
35 Diseases of Urinary System	187	2.1	18.2
36 Diseases of Male Genital Organs	2	0.0	0.2
37 Diseases of Female Genital Organs	3	0.0	0.3
42 Diseases of Skin	8	0.1	0.8
43 Musculoskeletal & Connective Tissue	71	0.8	6.9
44 Congenital Anomalies	44	0.5	4.3
45 Conditions in Perinatal Period	35	0.4	3.4
46 Symptoms & Ill-Defined Conditions	84	0.9	8.2
E47 Transport Accidents	190	2.1	18.5
E48 Accidental Poisoning	20	0.2	1.9
E49 Misadventures During Medical Care	4	0.0	0.4
E50 Accidental Falls	109	1.2	10.6
E51 Accidents Caused by Fire & Flames	13	0.1	1.3
E52 Other Accidents, Late Effects	78	0.9	7.6
E53 Effects of Drugs and Medication	8	0.1	0.8
E54 Suicide and Self-Inflicted Injury	113	1.3	11.0
E55 Homicide & Intentional Injury	12	0.1	1.2
E56 Other Violence	5	0.1	0.5

*Crude Rate per 100,000 population (Statistics Canada Population Base)

Accidents and Violence

During the year 1999 a total of 422 deaths due to accidents occurred in the Province of Saskatchewan. This represents a rate of 41.1 deaths by accident per 100,000 population in 1999 as compared to a rate of 36.5 deaths by accident per 100,000 population in 1998.

The number of suicides, which occurred in Saskatchewan during 1999, was 113, a rate of 11.0 suicides per 100,000 population, the same number that occurred in 1998.

There were 12 homicides in Saskatchewan in 1999, a significant decrease from the 1998 number of 29 homicides.

D. Natural Increase in Population

In 1999 the natural increase was 3,534 and the estimated actual increase was 3,393 giving rates per 1,000 population of 3.4 and 3.3 respectively.

Table 9. Natural Increase and Actual Increase, Saskatchewan, 1986 - 1999*

Year	Population	Live Births	Deaths	Natural Increase		Est. Actual Incr.	
				Number	Rate per 1,000 pop	Number	Rate per 1,000 pop
1986	1,009,615	17,513	8,061	9,452	9.4	-9,885	-9.8
1987	1,014,000	17,034	7,808	9,226	9.1	4,385	4.3
1988	1,011,200	16,763	8,100	8,663	8.6	-2,800	-2.8
1989	1,007,000	16,572	7,861	8,711	8.7	-4,200	-4.2
1990	1,000,300	16,090	8,044	8,046	8.0	-6,700	-6.7
1991	997,000	15,304	8,098	7,206	7.2	-3,300	-3.3
1992	993,700	15,004	7,793	7,211	7.3	-3,300	-3.3
1993	1,003,100	14,269	8,164	6,105	6.1	9,400	9.4
1994	1,016,200	14,038	8,308	5,730	5.6	13,100	12.9
1995	1,016,162	13,515	8,475	5,040	5.0	-38	-0.04
1996	1,022,537	12,974	7,713	5,261	5.1	6,375	6.2
1997	1,023,500	12,860	8,637	4,223	4.1	963	0.9
1998*	1,024,387	12,710	8,838	3,872	3.8	887	0.9
1999*	1,027,780	12,481	8,947	3,534	3.4	3,393	3.3

* See footnotes in Table 1.

E. Marriages

During the year 1999 a total of 5,900 marriages occurred in Saskatchewan. This total represents a rate of 5.7 marriages per 1,000 population. Marriage rates for Canada, the Provinces, and Saskatchewan for 1997 are given below for comparison.

Table 10. Marriage Rate per 1,000 Population, Canada and the Provinces, 1997

Province	Rate
Canada	5.1
Newfoundland	5.8
Prince Edward Island	6.4
Nova Scotia	5.5
New Brunswick	5.4
Quebec	3.3
Ontario	5.7
Manitoba	5.5
Saskatchewan	5.6
Alberta	6.1
British Columbia	5.5
Yukon	5.2
North West Territories	3.1

F. Divorces

In 1999 a total of 2,230 divorces and annulments were registered under *The Vital Statistics Act* in Saskatchewan at the time of publication. This does not represent the total number of divorce petitions filed in 1999 since some petitions are not yet finalized.

G. Life Expectancy

A life expectancy table is, in effect, the history of mortality of 100,000 male babies and of 100,000 female babies born at the same time. Life expectancy figures provide a graphic picture of the extent to which the saving of lives has gradually prolonged the average expectation of life and are a fairly good reflection of the general health and survival conditions at the time of their compilation.

According to the Saskatchewan life table compiled on the basis of the 1996 census, the life expectancy at birth reached an all time peak for females, 81.30 years, and for males, 75.40 years. The gain in life expectancy is greater in females. A sharp rise in the probability of death begins at age 56 for males and at 65 for females. The decrease in life expectancy is greater for males than for females.

Table 11. Life Expectancy, Saskatchewan, 1941, 1961, 1981, 1996

Life Expectancy					Gain or Loss In Life Expectancy		
					1961 over 1941	1981 over 1961	1996 over 1981
1941	1961	1981	1996				
Males							
At Birth	65.43	70.27	72.43	75.40	4.84	2.16	2.97
20	51.28	53.49	54.35	56.60	2.21	0.86	2.25
40	33.32	34.99	35.92	37.90	1.67	0.93	1.98
60	16.82	18.10	19.09	20.40	1.28	0.99	1.31
80	5.76	6.31	7.16	7.60	0.55	0.85	0.44
Females							
At Birth	68.19	75.93	79.61	81.30	7.74	3.68	1.69
20	53.08	58.35	60.85	62.40	5.27	2.50	1.55
40	34.96	39.09	41.64	43.00	4.13	2.55	1.36
60	18.26	21.09	23.65	24.80	2.83	2.56	1.15
80	6.38	7.29	8.94	9.90	0.91	1.65	0.96

Note: Source of figures for 1941: Life Tables for Canada and Regions, 1941 and 1931, D.B.S. Ottawa 1947. These figures have been calculated for the prairie provinces. The figures for 1961 were calculated for Saskatchewan by the Department of Health. The figures for 1981 and 1991 were taken from the Statistics Canada publication, Life Tables, Canada and Provinces, 1980-1982 and 1995-97.

H. Adoptions

There were 293 adoptions registered in Saskatchewan during 1999, compared to 247 adoptions in 1998. The total of 293 adoptions registered includes out-of-province adoptions of persons born in Saskatchewan as well as adoptions in Saskatchewan of persons born elsewhere.

I. Legal Changes of Name

During 1999 a total of 753 legal changes of name were registered in Saskatchewan. This represents a slight increase from the 738 changes of name registered in 1998. The total of 753 does not reflect the number of persons who changed their name as each application may affect more than one person and in some cases, an entire family.